Please add the following Abstract of the Invention

<u>Abstract</u>

A device for manufacturing a single-crystal solid phase by solidification of a liquid phase, comprising: a crucible capable of containing the solid phase and the liquid phase, the liquid phase being in contact with the crucible and the solid phase being separated from the crucible by an interstice; and a heating mechanism for heating the liquid phase capable of creating a thermal gradient at the level of an interface between the liquid phase and the solid phase, electromagnetic field generation, distinct from the heating mechanism, for applying an electromagnetic pressure on the junction surface of the liquid phase at the level of the interface comprising at least one spiral surrounding the crucible, and placed opposite to the area in which the interface forms in operation.